

**In the claims**

1. (Withdrawn and currently amended) A method of protecting an animal from disease, said method comprising:

a. producing, in host cell, one or more disease-related recombinant viral protein or peptide from white spot syndrome virus (WSSV) or Taura Syndrome Virus (TSV) that binds to and blocks and capable of blocking viral receptors needed for WSSV or TSV infection in the gut of the animal needed for WSSV or TSV infection, wherein the recombinant viral protein or peptide is selected from the group consisting of VP24, VP28, VP26, VP19, and TSV capsid protein; and

b. delivering, as a feed or feed additive, the recombinant viral protein or peptide to ~~an~~the animal suspected of being infected by the disease causing viral agent, wherein the recombinant viral protein or peptide inhibits or retards binding to the viral receptors of the disease causing viral agent that causes the disease in one or more cells of the animal.

2. – 4. (Cancelled)

5. (Withdrawn) The method of claim 1, wherein said producing in a host cell comprises transforming a host cell with a nucleic acid encoding the disease-related protein to form a transformed cell.

6. (Withdrawn) The method of claim 1, wherein the host cell is chosen from bacteria, algae, yeast, fungi, insects, animals, plants, and tissue cultures of any of the above.

7. (Withdrawn and currently amended) The method of claim 6, wherein the host cell is ~~an~~ algae.

8. (Withdrawn) The method of claim 6, wherein the host cell is a yeast.

9. (Withdrawn) The method of claim 6, wherein the host cell is a bacterium.

10. (Withdrawn) The method of claim 1, wherein the disease-related protein is a fusion protein.

11. (Cancelled)

12. (Withdrawn and currently amended) The method of claim 11, wherein the recombinant viral protein or peptide is a truncated ~~version of the~~ recombinant viral protein or peptide having binding affinities for the viral receptors.

13.-16. (Cancelled)

17. (Currently amended) A feed for an animal comprising one or more expressed recombinant viral protein or peptide from white spot syndrome virus (WSSV) or Taura Syndrome Virus (TSV), wherein the recombinant viral protein or peptide binds to and blocks ~~capable of binding and blocking~~ viral receptors needed for WSSV or TSV infection in the gut of the animal, ~~needed for WSSV or TSV infection in one or more cells of the animal,~~ wherein the recombinant viral protein or peptide is selected from the group consisting of VP24, VP28, VP26, VP19, and TSV capsid protein.

18. (Currently amended) The feed of claim 17, wherein the recombinant viral protein or peptide is a truncated ~~version of the~~ recombinant viral protein or peptide and having binding affinities for the viral receptors.

19. (Previously presented) The feed of claim 17 further comprising host cells in whole or broken form wherein the recombinant viral protein or peptide was expressed in the host cells.

20. (Previously presented) The feed of claim 19, wherein the host cells are members selected from the group consisting of bacteria, algae, yeast, and fungi.

21. (Currently amended) A feed additive for an animal comprising one or more recombinant viral protein or peptide from white spot syndrome virus (WSSV) or Taura Syndrome Virus (TSV) that inhibits or retards binding to ~~capable of binding to and blocking~~ viral receptors needed for WSSV or TSV infection in the gut of the animal, ~~needed for WSSV or TSV infection in one or more cells of the animal,~~ wherein the recombinant viral protein or peptide is selected from the group consisting of VP24, VP28, VP26, VP19, and TSV capsid protein.

22. (Previously presented) The feed additive of claim 21, further comprising host cells in whole or broken form wherein the recombinant viral protein or peptide was expressed in the host cells.

23. (Currently amended) The feed additive of claim 21, wherein the recombinant viral protein or peptide is fed to ~~[[an]]~~ the animal as purified protein, ~~[[or]]~~ semi-purified protein, an encapsulated purified protein or encapsulated semi-purified protein versions of these.

24. (Currently amended) The feed additive of claim 21, wherein the recombinant viral protein or peptide is a truncated ~~version of the~~ recombinant viral protein or peptide, and having binding affinities for the viral receptors.

25. (Currently amended) The feed additive of claim 21 24, further comprising host cells in whole or broken form wherein the recombinant viral protein or peptide was expressed in the host cells.

26. (Previously presented) The feed additive of claim 25, wherein the host cells are members selected from the group consisting of bacteria, algae, yeast, and fungi.

27.-31 (Cancelled)

32. (Previously presented) The feed of claim 17, wherein the animal is a crustacean.

33. (Previously presented) The feed of claim 32, wherein the crustacean is shrimp.

34. (Currently amended) The feed of claim 20, wherein the algae are *Chlorella vulgaris*.

35. (Withdrawn) The method of claim 1, wherein the feed further comprises the transformed host cells, in whole or broken form, wherein the recombinant viral protein or peptide was expressed in the transformed host cells.

36. (Withdrawn) The method of claim 1, wherein the animal is a crustacean.

37. (Withdrawn and currently amended) The method of claim 36, wherein the crustacean is a shrimp.

38. (Withdrawn and currently amended) The method of claim 37, wherein the algae are *Chlorella vulgaris*.